

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Patent Application of:  
Yoshiki IWATA

Application No.: 10/525,841

Confirmation No.: 9908

Filed: February 25, 2005

Art Unit: 1755

For: METHOD FOR PRODUCING  
HYDROREFINING CATALYST

Examiner: E. D. Wood

**DECLARATION PURSUANT TO 37 C.F.R §1.132**

Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

Sir:

I, Yoshiki Iwata, declare and say as follows:

I have a master's degree in Inorganic Material Chemistry which was conferred upon me by Tokyo University of Science, Graduate School of Science in Shinjuku-ku, Tokyo, Japan in 1993. I have been employed by JAPAN ENERGY CORPORATION since 1993 and I have had a total of 15 years of work and research experience in Inorganic Material Chemistry in JAPAN ENERGY CORPORATION including alumina catalyst carrier, desulfurization catalyst, refining process, etc., as indicated in attached curriculum vitae.

I am familiar with U.S. Application Serial No. 10/525,841, of which I am the inventor. I have reviewed the Office Actions issued on May 31, 2007 and November 29, 2007 in connection with this application. I have also reviewed all of the references cited by the Examiner in these Office Actions.

**A. EP 1 172141**

**a. pH of the carrying solution of Catalyst A in EP '141**

Experimental data obtained in connection with EP '141 shows that the pH of the carrying solution of Catalyst A prepared in Example 1 of EP '141 is 1.2.

**b. Raman spectroscopy spectrum of the carrying solution of EP '141**

The Raman spectroscopy spectrum of the carrying solution of Catalyst A prepared in Example 1 of EP '141 is shown in the attached graph. As evidenced by the attached graph, the carrying solution of EP '141 does not have a peak top between  $965\text{ cm}^{-1}$  and  $975\text{ cm}^{-1}$ .

**B. The present application**

**a. pH of the carrying solution**

The pH of the carrying solution in the present application is in the range of 2 to 5.

**b. Raman spectroscopy spectrum of the carrying solution**

The carrying solution of the present application has a peak top between  $965\text{ cm}^{-1}$  and  $975\text{ cm}^{-1}$ .

**C. Comparison of EP '141 and the present application**

As evidenced by the data discussed above, the pH and Raman spectroscopy spectrum of the carrying solution of Catalyst A in EP '141 are different from those of the carrying solution of the present application. Thus, the carrying solution of EP '141 does not inherently exhibit the same characteristics of the carrying solution of the instant invention.

I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

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Signature

Yoshiki IWATA  
Yoshiki IWATA

April 4, 2008  
Date

# Yoshiki IWATA

## Work Experience

1993 - Present	JAPAN ENERGY CORPORATION, Tokyo Japan
1993 - 1995	Research of alumina catalyst carrier
1995 - 1998	Loaned to Japan Petroleum Energy Center (juridical foundation in Japan), research of high-functional catalyst
1998 - 2003	Development of direct desulfurization catalyst, indirect desulfurization catalyst, ultra-deep desulfurization catalyst of light oil fraction
2003 - 2005	Experiment and research work at refinery section: experimental research, equipment modification study, evaluation of desulfurization catalyst performance
2005 - 2006	Research of refining process
2006 - 2007	Production planning, quality control, material distribution management for catalyst-producing factory
2007 - present	Petrochemicals development

## Education

1993	MSc in Inorganic Material Chemistry Tokyo University of Science, Graduate School of Science Tokyo, Japan
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Raman spectroscopy spectrum of Catalyst A prepared in Example 1 of EP 1,172,141

